Estimated Variance in Prediction Errors[1]
Sub-Area C by % Solids

Legend:
- Duplicate Analysis
- "Near" Sample Group
- "Far" Sample Group

X-axis categories: Duplicate Analysis, % Solids < 40%, % Solids > 40%

Variance Components Analysis - Percent Solids <40%

"Near" Sample Group = 1.2
"Far" Sample Group = 5.8

Laboratory component = Var_{Dup} = **2.4**
Dredging process component = $Var_{Near} - Var_{Dup}$ = 1.2 - 2.4 ~ **0**
Model uncertainty component = $Var_{Far} – Var_{Near}$ = 5.8 - 2.4 = **3.4**
* Conclusion: Little variation entering from dredging process and model uncertainty.

Variance Components Analysis - Percent Solids >40%

"Near" Sample Group = 1.4
"Far" Sample Group = 3.8

Laboratory component = Var_{Dup} = **2.4**
Dredging process component = $Var_{Near} - Var_{Dup}$ = 1.4 - 2.4 ~ **0**
Model uncertainty component = $Var_{Far} – Var_{Near}$ = 3.8 - 2.4 = **1.4**
* Conclusion: Little variation entering from dredging process and model uncertainty.

[1] Variance of prediction errors, which are defined as
post-dredge PCB - model prediction. When using
composite samples, individual term in variance equation
was multiplied by the number of samples in composite.

"Near" group consists of post-dredge data not more than 11 feet
distant from a pre-dredge sample location. These are mostly the post-
dredge primary samples. "Far" group consists of post-dredge data at
least 17 feet from a pre-dredge location. These are mostly secondary
samples.

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FIGURE 3-39

Lower Fox River OU1
Estimated Variance in PCB Prediction Errors
Sub-Area C by Percent Solids

Scale: Not To Scale		Revised December 2006
Drawn By: SGL	Checked By: TMK1	Scope: 04g007